

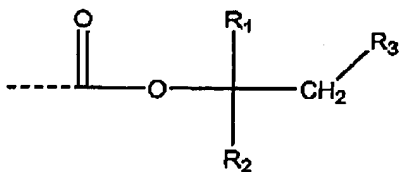
Application No.: 10/713606
 Docket No.: CL2229USNA

Page 2

Listing of Claims

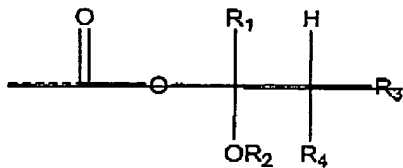
Claim 1. (currently amended) A process for fabricating an electronic device comprising:

a) coating a substrate ~~an electronic device structure~~ with a positive photo-imageable protective layer comprising a polymer ~~in which~~ comprising, as polymerized units, monomers of which at least ~~50~~ 65 mole percent ~~of the monomers in the polymer~~ comprise a structure selected from the group consisting of have a first structure:



where R_1 is hydrogen or lower alkyl; R_2 is a lower alkyl; and R_3 is hydrogen or a lower alkyl where the definition of lower alkyl includes alkyl groups having 1 to 6 linear or cyclic carbon atoms; and from about 10 to about 35 mole percent have a second structure:

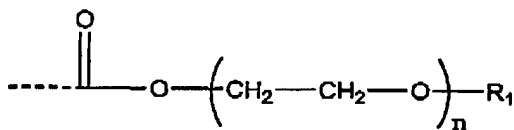
b)



Application No.: 10/713606

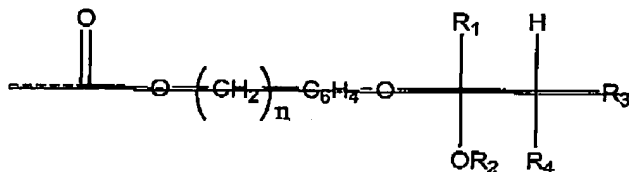
Docket No.: CL2229USNA

Page 3



where R_1 is hydrogen or lower alkyl and n is an integer of 2 to 3; ~~R_2 is a lower alkyl; and R_3 and R_4 are independently hydrogen or a lower alkyl where the definition of lower alkyl includes alkyl groups having 1 to 6 carbon atoms and the joining of R_4 and R_2 , or R_4 and either R_3 or R_4 , or R_2 and either R_3 or R_4 to form a 5-, 6-, or 7-membered ring; and~~

— c)



~~where R_1 is hydrogen or lower alkyl; R_2 is a lower alkyl; and R_3 and R_4 are independently hydrogen or a lower alkyl where the definition of lower alkyl includes alkyl groups having 1 to 6 carbon atoms and the joining of R_4 and R_2 , or R_4 and either R_3 or R_4 , or R_2 and either R_3 or R_4 to form a 5-, 6-, or 7-membered ring;~~

b) irradiating a first region of said substrate coated with said polymer with UV radiation;

c) heating said polymer and said protective layer to convert said polymer;

d) developing said converted polymer; and

e) irradiating a second region of said substrate coated with said converted polymer.

Application No.: 10/713606

Docket No.: CL2229USNA

Page 4

Claims 2-3 (cancelled).

Claim 4 (currently amended). The process of Claim 1 ~~or Claim 2~~ further comprising adding to the photo-imageable polymer 0.5-30 mole% of photoacid generator and 10-1000 ppm of photosensitizer.

Claim 5 (cancelled).

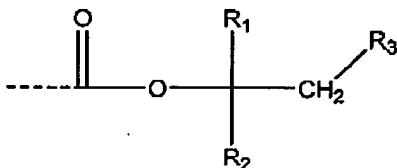
Claim 6. (new) The process of claim 1 wherein said monomers having said first structure are selected from: t-butyl methacrylate, t-butyl acrylate, neopentyl methacrylate, neopentyl acrylate, 1-Bicyclo{2,2,1}heptyl methacrylate, 1-Bicyclo{2,2,1}heptyl acrylate, 1-Bicyclo{2,1,1}hexyl methacrylate 1-Bicyclo{2,1,1}hexyl acrylate, 1-Bicyclo{1,1,1}pentyl methacrylate, 1-Bicyclo{1,1,1}pentyl acrylate, 1-adamantyl methacrylate, 1-adamantyl acrylate, and derivatives thereof.

Claim 7. (new) The process of claim 1 wherein said monomers having said second structure are selected from 2-ethoxy methacrylate and 2-ethoxy acrylate.

Claim 8. (new) The process of claim 1 wherein said polymer further comprises, as polymerized units, up to about 10 mole percent of a monomer selected from methyl methacrylate, methyl acrylate, methacrylic acid, and hydroxyl ethyl methacrylate.

Claim 9. (new) The process of claim 1 wherein said polymer comprises about 70 mole percent polymerized units having said first structure and about 30 mole percent polymerized units having said second structure.

Claim 10. (new) A polymer comprising as polymerized units, monomers of which at least 65 mole percent have a first structure:

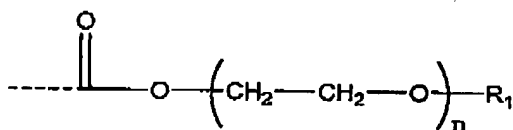


Application No.: 10/713606

Docket No.: CL2229USNA

Page 5

where R_1 is hydrogen or lower alkyl; R_2 is a lower alkyl; and R_3 is hydrogen or a lower alkyl where the definition of lower alkyl includes alkyl groups having 1 to 6 linear or cyclic carbon atoms; and from about 10 to about 35 mole percent have a second structure:



where R_1 is hydrogen or lower alkyl and n is an integer of 2 to 3.

Claim 11. (new) The polymer of claim 10 wherein said polymer further comprises, as polymerized units, up to about 10 mole percent of a monomer selected from methyl methacrylate, methyl acrylate, methacrylic acid, and hydroxyl ethyl methacrylate.

Claim 12. (new) The polymer of claim 10 wherein said polymer comprises about 70 mole percent polymerized units having said first structure and about 30 mole percent polymerized units having said second structure.

Claim 13. (new) The polymer of claim 10 wherein said monomers having said first structure are selected from: t-butyl methacrylate, t-butyl acrylate, neopentyl methacrylate, neopentyl acrylate, 1-Bicyclo{2,2,1}heptyl methacrylate, 1-Bicyclo{2,2,1}heptyl acrylate, 1-Bicyclo{2,1,1}hexyl methacrylate 1-Bicyclo{2,1,1}hexyl acrylate, 1-Bicyclo{1,1,1}pentyl methacrylate, 1-Bicyclo{1,1,1}pentyl acrylate, 1-adamantyl methacrylate, 1-adamantyl acrylate, and derivatives thereof.

Claim 14. (new) The polymer of claim 10 wherein said monomers having said second structure are selected from 2-ethoxy methacrylate and 2-ethoxy acrylate.